

Amendments to the Claims:

This listing of claims will replace all prior versions, and listings, of claims in the application:

Listing of Claims:

Claim 1 (currently amended) A method of forming a slotted substrate while minimizing a chip count in a shelf surrounding a slot, the method comprising:

depositing a thin film over a substrate, wherein the thin film contains plural layers including at least an insulating dielectric barrier layer, an interdielectric thin film layer, a resistive layer and a metal conductive layer; and

forming the a slot in the substrate through a slot region that extends through the substrate and the thin film plural layers; and

placing the plural layers in a predefined deposit order over the substrate so that a chip count in a shelf surrounding the slot is minimized when the slot is formed in the substrate through the slot region.

Claim 2 (currently amended) The method of claim 1 wherein the thin film is a metal film the insulating dielectric barrier layer is deposited first, the interdielectric thin film layer is deposited over the dielectric barrier layer, the resistive layer is deposited over the interdielectric thin film layer and the metal conductive layer is deposited over the resistive layer.

Claim 3 (currently amended) The method of claim 1 wherein the thin film is a polymer film insulating dielectric barrier layer includes a cavitation barrier layer.

Claim 4 (currently amended) The method of claim 1 wherein the thin film is a dielectric film insulating dielectric barrier layer includes a polymer barrier layer.

Claim 5 (currently amended) The method of claim 1 wherein the thin film is a ductile material.

Claim 6 (original) The method of claim 1 wherein the deposited thin film is under compression.

Claim 7 (original) The method of claim 1 wherein the slot is formed mechanically.

Claim 8 (currently amended) The method of claim 1 wherein the substrate is silicon, and the thin film is contains a field oxide layer.

Claim 9 (currently amended) The method of claim 1 wherein a plurality of thin films layers are deposited over the substrate, wherein the slot region extends through the plurality of thin films layers, wherein a thickness of the plurality of thin films layers ranges from 0.25 microns up to about 30 50 microns.

Claim 10 (currently amended) The method of claim 1 wherein the thin film is contains at least one of silicon nitride and silicon carbide.

Claim 11 (currently amended) The method of claim 1 wherein the thin film is contains PSG.

Claim 12 (currently amended) A method of forming a slotted substrate ~~while minimizing crack formation in a shelf surrounding a slot~~, the method comprising:

depositing [[a]] at least four plural thin film layers over a substrate, wherein one of the plural thin film layers is a metal thin film layer, one of the thin film layers is an insulating dielectric barrier layer, one of the thin film layers is an interdielectric thin film layer and one of the thin film layers is a resistive layer; and
forming the slot in the substrate through a slot region that extends through the substrate and the thin film

minimizing a chip count in a shelf surrounding a slot defining an area of the slotted substrate by layering the plural thin film layers in a predefined deposit order over the substrate before forming the slot in the substrate through a slot region that extends through the substrate and the plural thin film layers.

Claim 13 (currently amended) A method of forming a slot in a substrate comprising:

depositing a ductile thin film plural thin film layers over a substrate, wherein one of the layers is a ductile thin film layer, one of the thin film layers is an insulating dielectric barrier layer, one of the thin film layers is an interdielectric thin film layer and one of the thin film layers is a resistive layer; and

forming a slot in the substrate through a slot region that extends through the substrate and the ductile thin film

extending the slot through the ductile thin film layer and the substrate defined by a slot region and layering the plural thin film layers in a predefined deposit order to minimize a chip count in a shelf surrounding the slot.

Claim 14 (currently amended) The method of claim 13 wherein the thin film is a metal film plural thin film layers further includes a cavitation barrier layer.

Claim 15 (currently amended) The method of claim 13 wherein the thin film is a dielectric film interdielectric thin film layer is an insulating glass layer.

Claim 16 (currently amended) The method of claim 13 wherein the thin film is a polymer film resistive thin film layer is a Tantalum Aluminum resistive layer.

Claim 17 (original) The method of claim 13 wherein the thin film is deposited in a compressive state.

Claim 18 (currently amended) The method of claim 13 wherein the thin film [[is]] contains a passivation layer.

Claim 19 (currently amedned) The method of claim 13 wherein the thin film [[is]] contains an insulating layer grown from the substrate.

Claim 20 (currently amended) A coated substrate for a center feed printhead comprising:

a substrate;
~~a polymer film applied over the substrate; and~~
~~a slot region extending through the substrate and the polymer film~~
means for depositing at least four plural thin film layers over a substrate, wherein one of the plural thin film layers is a metal thin film layer, one of the thin film layers is an insulating dielectric barrier layer, one of the thin film layers is an interdielectric thin film layer and one of the thin film layers is a resistive layer;
means for forming the slot in the substrate through a slot region that extends through the substrate and the thin film; and
means for minimizing a chip count in a shelf surrounding a slot defining an area of the slotted substrate by layering the plural thin film layers in a predefined deposit order over the substrate before forming the slot in the substrate through a slot region that extends through the substrate and the plural thin film layers.

Claim 21 (currently amended) A coated substrate for a center feed printhead comprising:

a substrate;
a metal thin film applied over the substrate, wherein the thin film contains plural layers including at least an insulating dielectric barrier layer, an interdielectric thin film layer, a resistive layer and a metal conductive layer; and
a slot region extending through the substrate and the metal thin film, wherein the plural layers are deposited in a predefined order over the substrate so that a chip count in a shelf surrounding the slot region is minimized when a slot is formed in the substrate through the slot region.

Claim 22 (currently amended) The substrate of claim 21 wherein the metal thin film [[is]] contains aluminum.

Claim 23 (currently amended) The substrate of claim 21 wherein the metal thin film [[is]] contains tantalum.

Claim 24 (currently amended) The substrate of claim 21 wherein the ~~metal~~
thin film [[is]] contains tantalum aluminum.

Claim 25 (currently amended) The substrate of claim 21 wherein a thickness
of the ~~metal~~ thin film is at least 0.25 microns.

Claim 26 (currently amended) The substrate of claim 21 wherein the ~~metal~~
thin film is under compressive stress.

Claim 27 (original) The substrate of claim 21 further comprising a cavitation
barrier layer, wherein the slot region extends through the cavitation barrier layer.

Claim 28 (original) The substrate of claim 21 further comprising a passivation
layer, wherein the slot region extends through the passivation layer.

Claim 29-32 (canceled)